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(12) **United States Patent**
Tanada

(10) **Patent No.: US 7,187,204 B2**
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(54) **CIRCUIT FOR INSPECTING SEMICONDUCTOR DEVICE AND INSPECTING METHOD**

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See application file for complete search history.

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(57) **ABSTRACT**

It is configured by plurality of NAND circuits connected in series through a plurality of inverters, and a plurality of NOR circuits connected in series through the plurality of inverters. Each of a plurality of source signal lines provided in a pixel portion is connected to one input terminal of a NAND circuit and a NOR circuit, and an output of an inspection is obtained from final lines of the NAND circuit and the NOR circuit connected in series. In this manner, an inspecting circuit which is capable of determining a defect simply and accurately by using a small-scale circuit, and a method thereof are provided.

25 Claims, 17 Drawing Sheets